Peripheral Neuritis Associated with Discoid Lupus Erythematosus

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WHEN PERIPHERAL NEURITIS occurs in lupus erythematosus, the patient usually is terminally ill.* The case which is to be presented here is unusual in that the patient made a complete recovery. So far as could be determined, the combination of phenomena that occurred in this instance—namely, a self-healing polyneuritis occurring in association with an otherwise purely cutaneous lupus—makes this case unique.

REPORT OF A CASE

A 45-year-old white woman was first admitted to the Pasadena Dispensary as an out-patient on February 16, 1955. The chief complaint was of a skin eruption, of ten years' duration, involving the face and neck. A diagnosis of chronic discoid lupus erythematosus was made on the basis of the appearance of the eruption, and biopsy confirmed this impression. A complete physical examination, including review of organ systems and a complete history of past illnesses, revealed nothing of importance. Numerous laboratory tests were done, including a lupus erythematosus cell test and an x-ray film of the chest. The only abnormal result was a sedimentation rate (Westergren method) of 55 mm. in one hour.

Except for the dermal lesions, the patient felt herself to be in good health. She was the only support of an invalid husband and she worked six days a week as a waitress. Aralen was administered (500 mg. daily) and the cutaneous lesions cleared. The patient continued to work and was in excellent health until November, 1955, when her husband died. Soon afterward evidence of a reactive depression was noted when she visited the clinic. She felt that life had lost all its meaning and that it was not worth while to go on. She frequently wept during the course of a visit and she said that thoughts of suicide were tempting her. Her only son had married a few months previously and this accentuated her feeling of loneliness and abandonment. In December she complained of difficulty in raising her arms, of difficulty in rising from a chair, of a heavy feeling in the legs, of weakness in the legs and swelling of the lower legs. A neurological examination disclosed no abnormality. An electromyogram was made of the muscles receiving innervation via the anterior primary divisions of the second lumbar through the second sacral roots on the left side. The results of this examination were within normal limits.

The patient continued to work but her complaints increased. She was often tearful during clinic visits and in conversation gave evidence of continued depression. In February a 24-hour specimen of urine was examined for uroporphyrin but the reaction was negative. The cell contents of the blood and results of urinalysis remained within normal limits, and the patient was not febrile at any time.

On August 16, 1956, the patient was admitted to the Huntington Memorial Hospital because she was unable to walk. On complete physical examination the only abnormality noted was areflexia of the upper and lower extremities. A neurological consultant was of the opinion that "obvious peripheral polyneuritis" was present. An electroencephalogram made August 22, was within normal limits. Electromyograms were done on selected muscles supplied by the anterior and posterior primary divisions of the first lumbar through the third sacral roots bilaterally. Moderate changes of denervated activity were recorded in the muscles of the feet and legs and some in the thighs. No denervated activity was recorded in the pelvic girdle and none in the muscles of the back. The changes were peripheral, involving the lumbosacral plexes, both on the right and the left. The muscles of the upper limbs were not tested. The changes were consistent with a diagnosis of peripheral neuritis.

During the patient's stay in hospital, the body temperature remained normal. Results of all laboratory tests, including a lupus erythematosus cell test, blood protein analysis, serological tests for syphilis, determination of clotting and bleeding times, roentgenograms of the chest, erythrocyte and leukocyte counts, cephalin flocculation and sedimentation rate were within normal limits. No abnormalities were noted on examination of the spinal fluid or in a

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*References 1, 2, 3, 4, 5, 7, 8.

detailed ophthalmological examination, performed by an ophthalmologist.

During the patient's stay in the hospital, Aralen was discontinued because of suspicion (later shown to be unfounded) that it might have caused the neuritis.

As the degree of disability forbade the patient's returning to work, the issue of her going to live in her son's home was forced. During the stay in hospital, administration of prednisolone, 10 mg. daily, was begun, and a week later when she left the hospital the patient was walking. However, the use of prednisolone had to be discontinued after three weeks because of gastric distress.

For the next two and a half years, the patient lived in her son's home doing light household tasks. There never again was overt evidence of the reactive depression which had been so apparent at the time of her entering the hospital. During these years results of repeated urinalysis, blood cell counts, and determination of sedimentation rate were always within normal range and the patient was never febrile. A neurological consultant who examined the patient in February, 1959, reported a complete recovery from the peripheral neuritis.. The discoid lupus of the face was also almost entirely cleared.

DISCUSSION

It cannot be proved that in this patient peripheral neuritis was caused by lupus erythematosus. However, this connection cannot be proved absolutely in any patient who has lupus and peripheral neuritis since the two conditions are only rarely associated and the pathological findings in those nerves which have been studied under the microscope in the reported cases are not uniquely different from those found in other collagen diseases. What sets the present case apart from the others that have been reported with this concurrence is the fact that the patient did not die.

An aspect of this case—and one usually not mentioned in reports of cases of lupus erythematosus—was the effect of emotionally charged events in the patient's life on the course of the lupus. In this patient, peripheral neuritis appeared after the husband died. The patient was an immigrant with no roots in the community in which she was living. The marriage of her only son and the death of her husband, in rapid succession, caused a reactive depression which chronologically was related to the appearance of neuritis. Whether or not it was the actual cause of neuritis is a question that cannot be answered. It should be noted in this connection that some investigators have expressed a belief that a reactive depression may usher in an attack of disseminated lupus erythematosus.[6]

When the patient went to live in her son's home, her depression abated, and later the neuritis and lupus cleared also, even though active medical treatment had been discontinued. Whether or not this change in the patient's life was partially responsible for the lessening of the organic diseases is another unanswerable question.

SUMMARY

In the present case peripheral polyneuritis occurred in association with discoid lupus erythematosus. This is the first case so far reported in the literature in which such an association has occurred. An attempt has been made in this report to touch upon a neglected subject in the literature of lupus erythematosus—namely, the influence of psychological factors on the disease in certain patients.

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Temporal Arteritis

A Report of Two Cases Without Systemic Symptoms

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TEMPORAL ARTERITIS is a rare disease that is being recognized with increasing frequency. It has usually been regarded as a localized disease of the temporal arteries,[6,9,11] but gradually the description of the disease has been expanded to include not only all the cranial arteries,[2,17] but almost any other artery in the body. It has been described as occurring in the coronary arteries[9,13] and in other larger arteries.[4]

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